



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/772,893	02/04/2004	Pravin K. Narwankar	008209	5371
45401 7590 02/05/2009 APPLIED MATERIALS/BSTZ BLAKELY SOKOLOFF TAYLOR & ZAFMAN LLP 1279 OAKMEAD PARKWAY SUNNYVALE, CA 94085-4040			USA/FEP/GCM/PJS	
			EXAMINER	
			STOUFFER, KELLY M	
			ART UNIT	PAPER NUMBER
			1792	
			MAIL DATE	DELIVERY MODE
			02/05/2009	PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

## **DETAILED ACTION**

### ***Response to Arguments***

Applicant's arguments filed 26 January 2009 have been fully considered but they are not persuasive. The applicant further argues that Bernashel does not teach the claimed temperature range, and further that Bernashel teaches that the claimed temperature range is undesirable. However, the RTP process described in Bernashel et al. uses the claimed temperatures (column 1 lines 35-55). Bernashel teaches the claimed temperatures in a RTP process involving NO but does not find the claimed temperature range desirable because it does not localize enough nitrogen at the interface between the substrate and the gate oxide layer (column 1 lines 47-55). However, one of ordinary skill in the art would recognize that Bernashel can be modified to this temperature depending on the amount of nitrogen desired at the interface between the substrate and the gate oxide layer. It would have been obvious to a person having ordinary skill in the art at the time the invention was made to modify the temperatures of Bernashel within the claimed ranges, since it has been held that where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable ranges involves only routine skill in the art. *In re Aller*, 220 F.2d 454, 105 USPQ 223 (CCPA 1955).

Therefore, for at least these reasons, the rejections of the previous office action are maintained. The amendments will not be entered after final as they do not simplify issues for appeal, and further, because they raise new issues requiring further consideration and search due to the dependant claims on the amended limitation.

Art Unit: 1792

Any inquiry concerning this communication or earlier communications from the examiner should be directed to KELLY STOUFFER whose telephone number is (571)272-2668. The examiner can normally be reached on Monday - Thursday 7:00-5:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Timothy Meeks can be reached on (571) 272-1423. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Kelly Stouffer  
Examiner  
Art Unit 1792

kms

/Timothy H Meeks/  
Supervisory Patent Examiner, Art Unit 1792

Application/Control Number: 10/772,893  
Art Unit: 1792

Page 4